



# United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/708,397	02/29/2004	Chung-Yuo Wu	MSCP0020USA	2396
27765 7590 01/05/2007 NORTH AMERICA INTELLECTUAL PROPERTY CORPORATION P.O. BOX 506 MERRIFIELD, VA 22116			EXAMINER	
			LARYEA, LAWRENCE N	
			ART UNIT	PAPER NUMBER
			3768	
	·		· · · · · · · · · · · · · · · · · · ·	
SHORTENED STATUTORY	Y PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE	
3 MON	NTHS	01/05/2007	PAPER	

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

·	Application No.	Applicant(s)				
Office Action Summers	10/708,397	WU ET AL.				
Office Action Summary	Examiner	Art Unit				
	Lawrence N. Laryea	3768				
The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply						
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.  - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.  - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).						
Status						
1) Responsive to communication(s) filed on						
·	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is					
	closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.					
Disposition of Claims						
4)⊠ Claim(s) <u>1-5</u> is/are pending in the application,						
	4a) Of the above claim(s) is/are withdrawn from consideration.					
5) Claim(s) is/are allowed.						
6)⊠ Claim(s) <u>1-5</u> is/are rejected.						
7) Claim(s) is/are objected to.						
8) Claim(s) are subject to restriction and/or	r election requirement.					
Application Papers						
9) The specification is objected to by the Examiner.						
10) ☐ The drawing(s) filed on 29 February 2004 is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.						
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).						
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).						
11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.						
Priority under 35 U.S.C. § 119						
<ul> <li>12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).</li> <li>a) All b) Some * c) None of:</li> <li>1. Certified copies of the priority documents have been received.</li> <li>2. Certified copies of the priority documents have been received in Application No</li> <li>3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).</li> <li>* See the attached detailed Office action for a list of the certified copies not received.</li> </ul>						
Attachment(s)						
1) Notice of References Cited (PTO-892)  4) Interview Summary (PTO-413)						
2) Notice of Draftsperson's Patent Drawing Review (PTO-948)	Paper No(s)/Mail D	ate				
3) Information Disclosure Statement(s) (PTO/SB/08)  Paper No(s)/Mail Date 12/13/06.  5) Notice of Informal Patent Application  6) Other:						

Application/Control Number: 10/708,397 Page 2

Art Unit: 3768

### **DETAILED ACTION**

### Claim Rejections - 35 USC § 112

- 1. The following is a quotation of the second paragraph of 35 U.S.C. 112:
  - The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.
- 2. Claims 3 -6 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.
- 3. Claim 3, line 3 recites the limitation "... a motor fixed on the housing or the clipper and its power output coupled to the clipper or the housing in order to convey the clipper..." it is unclear if the motor is fixed on the housing or clipper. Also, it is unclear if the power output is coupled to the clipper or the housing.
- 4. Claim 3 line 4 recites the limitation "its" renders the claims indefinite because one cannot be certain what "its" intended to refer to.
- 5. Claim 5, line 3 recites the limitation "the inner wall." There is insufficient antecedent basis for this limitation in the claim.
- 6. Claim 3, lines 2-3 recite the limitation "the front end." There is insufficient antecedent basis for this limitation in the claim.
- 7. Claim 6, line 3 recites the limitation "the inner wall." There is insufficient antecedent basis for this limitation in the claim.

Application/Control Number: 10/708,397 Page 3

Art Unit: 3768

# Claim Rejections - 35 USC § 102

8. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

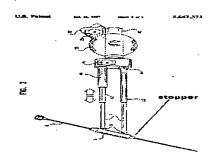
- (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.
- 9. Claims 1-3 and 6 are rejected under 35 U.S.C. 102(b) as being anticipated by Paltieli (Patent 5647373).
- 10. Re Claims 1-2: Paltieli teaches an injection device for detecting the position of a vein (target) of an examinee and injecting comprising: a housing (See Fig.1) where a pulse ultrasound probe (4) installed in front of the housing, and a microprocessor (32) installed in the housing wherein the pulse ultrasound probe comprises an oscillator for emitting a pulse ultrasonic signal toward the examinee along the direction of the housing and a sensor for receiving the ultrasonic signals reflected by the examinee and converting the reflected signals into electric signals to output to the microprocessor (See Col. 7, line 1-10 Col. 7, line 31-35); a propeller (motor,25) for moving the house along the direction of the pulse ultrasonic signals; and a syringe(needle) coupled to the propeller (See Col. 4, line 65-67), to move along the direction of the pulse ultrasonic signals by the propeller (See Col. 3, line 14-20).
- 11. Re Claim 3: Paltieli teaches an injection device wherein the propeller (25) comprises a clipper (See fig.5 for clippers 8,42,43,44,45,23 and 40) for clipping the needle coupled to the housing in order to convey the clipper along the direction of the pulse ultrasonic signals Col. 4, line 35-38 Col. 4, line 57-61).

Application/Control Number: 10/708,397

Art Unit: 3768

12. Re Claim 3: **Paltieli** teaches an injection device wherein a stopper is formed at a predetermined distance from the front end on the inner wall of the housing in order to stop the clipper at a predetermined depth. It is inherent to have a stopper on a needle in order to target required positions and depths on human body during medical diagnostics.

See diagram below for a stopper



## Claim Rejections - 35 USC § 103

- 13. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
  - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 14. Claims 4 and 5 are rejected under 35 U.S.C. 103(a) as being unpatentable over Paltieli in view of Akhavi (Patent 4317455).
- 15. Re claims 4 and 5: **Paltieli** disclose an injection device for detecting the position of a vein (target) comprising a pulse ultrasound probe, a sensor, a microprocessor and a propeller for to moving a housing along the direction of the pulse ultrasonic signals

probe but does not that the medical injection device has a cover that covers the front end of the housing and the inner wall of the housing and an aperture is formed on the housing to contain the clipper.

16. Akhavi discloses a medical injection device that has a cover (15) that covers the front end of the housing and the inner wall of the housing (See Col. 2, line 15-17 and Fig.2).

It would have been obvious to one having ordinary skill in the art at the time invention was made to modify the medical injection device of **Paltieli** to include a covers that covers the front end of the housing and the inner wall of the housing similar to that **Akhavi** in order to protect and prevent the needle from infection, germs and damages.

17. Applicant has not disclosed that "an <u>aperture is formed on the housing</u> to contain the clipper" provides an advantage, is used for a particular purpose, or solves a stated problem. One of ordinary skill in the art, furthermore, would have expected the clipper of **Paltieli**, and applicant's invention to perform equally well with or without an aperture formed on the housing to contain the clipper, as any form of clipper, would perform or yield the same function of movement of the needle (syringe) to any desired locations where ultrasonic signals occurred.

Therefore, it would have been prima facie obvious to modify **Paltieli** to obtain the invention as specified in claim 4 because such a modification would have been considered a mere design consideration which fails to patentably distinguish over the prior art of **Paltieli**.

Art Unit: 3768

### Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Schwartz (Patent 6056690) disclose an intravenous location device comprising a pulse ultrasound probe, a sensor and microprocessor which is configured with propeller (motor) to move (x-y directions) according to predetermined levels in respect to the signals received (reflected) from the pulse ultrasound probe.

Paltieli (Patent 6311540) disclose an intravenous location device comprising a pulse ultrasound probe, a sensor and microprocessor which is configured with propeller to move in respect to signals from the pulse ultrasound probe.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Lawrence N. Laryea whose telephone number is 571-272-9060. The examiner can normally be reached on 9:30 a.m.-5:30 p.m. EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Eleni Mantis-Mercader can be reached on 571-272-4740. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Application/Control Number: 10/708,397

Art Unit: 3768

Page 7

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

LNL

ELENI MANTIS MERCADADI SUPERVISORY FATENT EXAMINER